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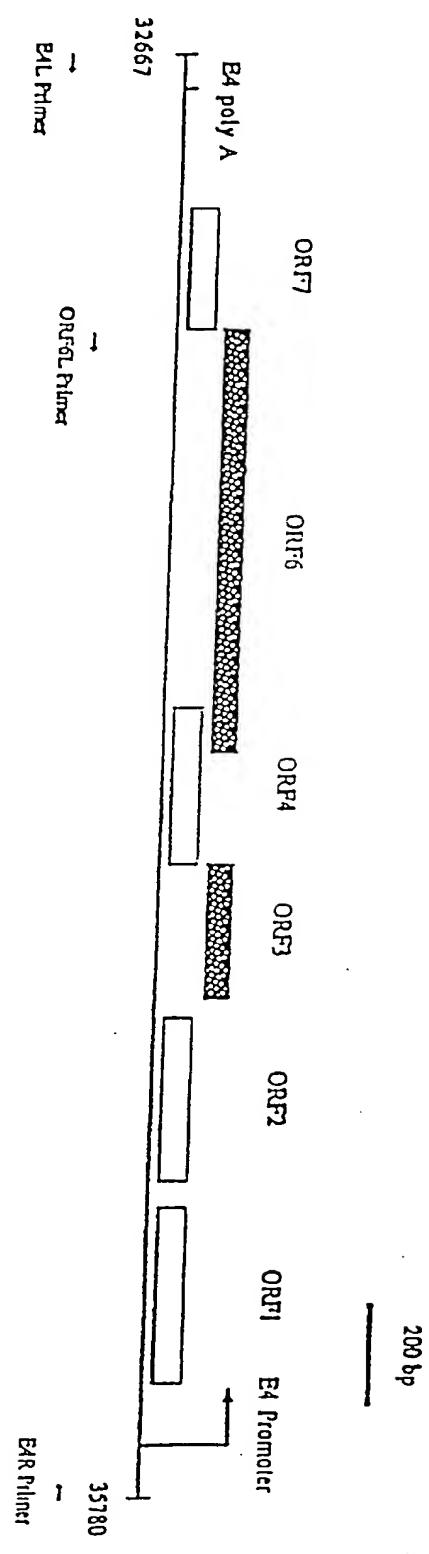


Figure 1

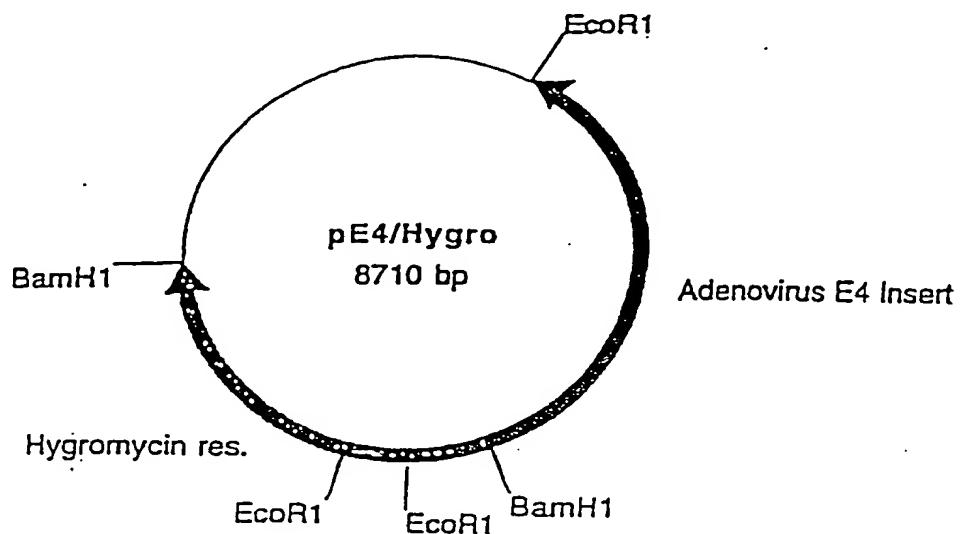


Figure 2

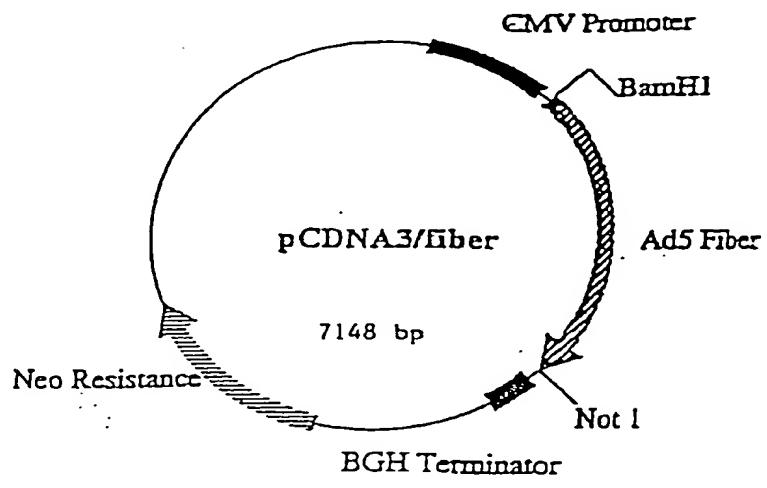


FIGURE 3

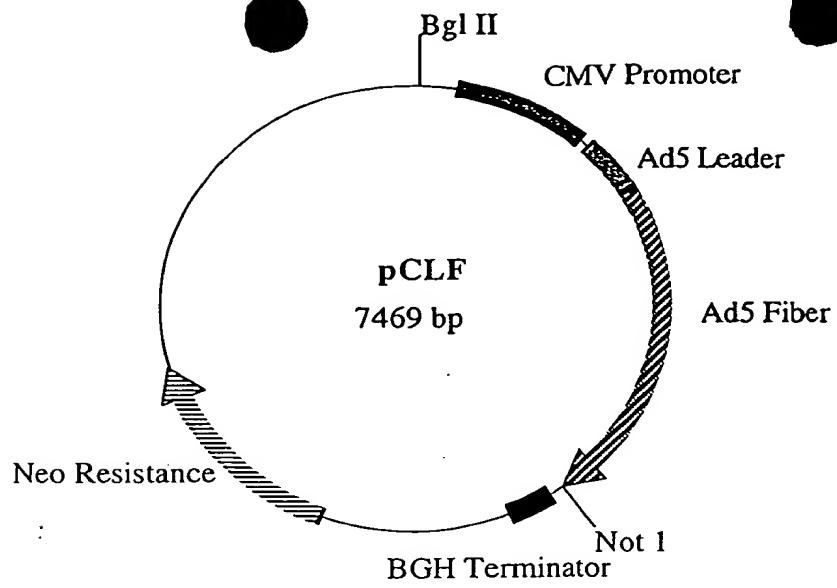


Fig. 4

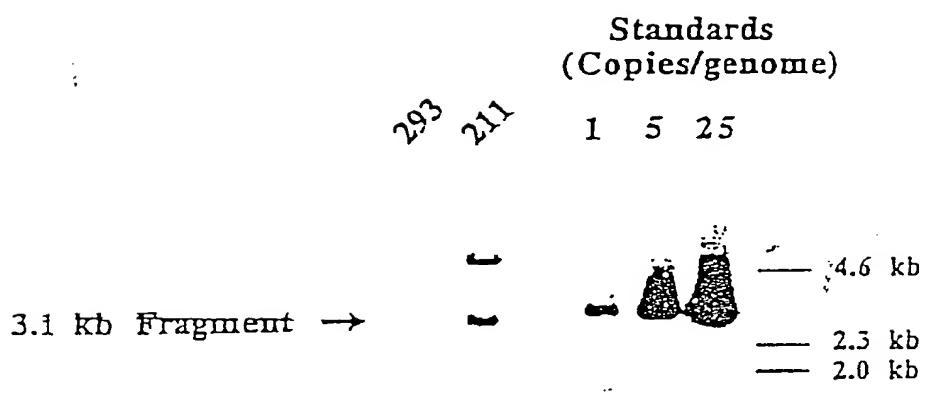


Figure 5

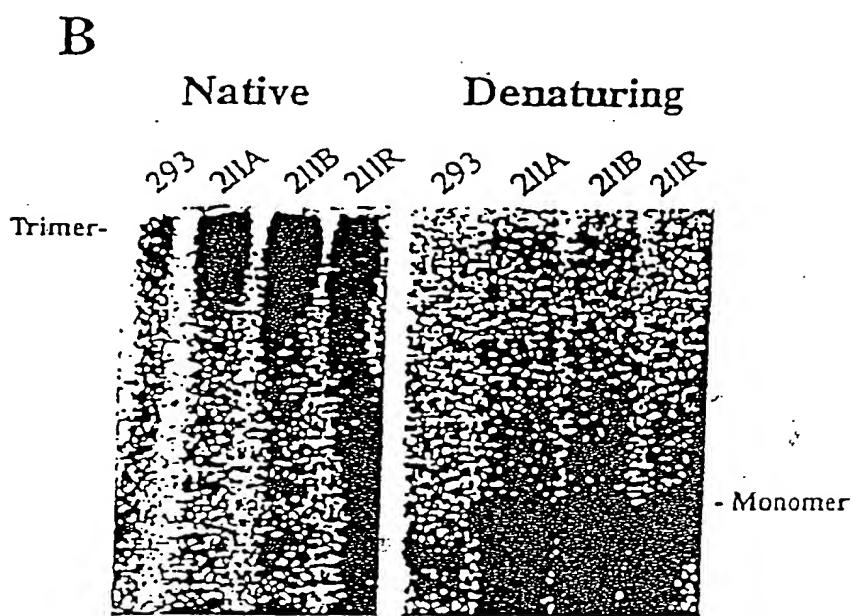


Figure 6

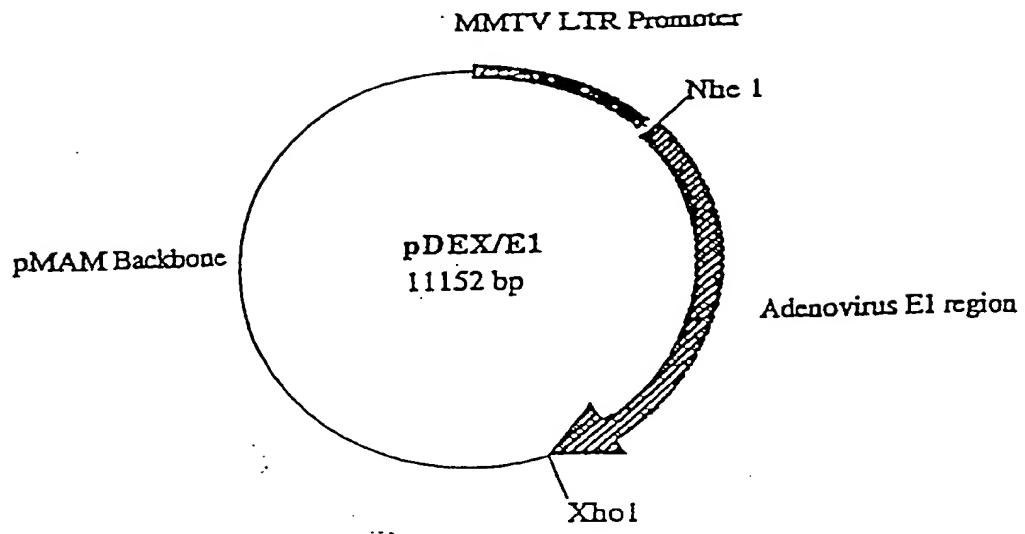


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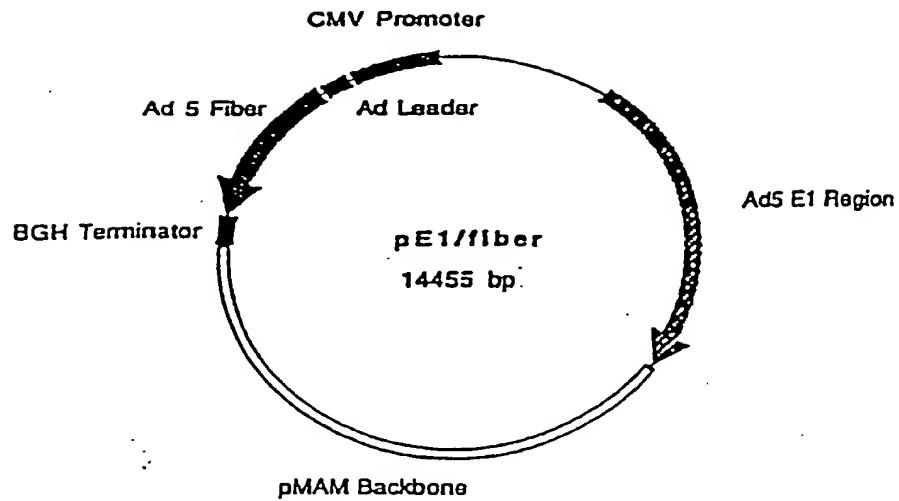


Figure 8

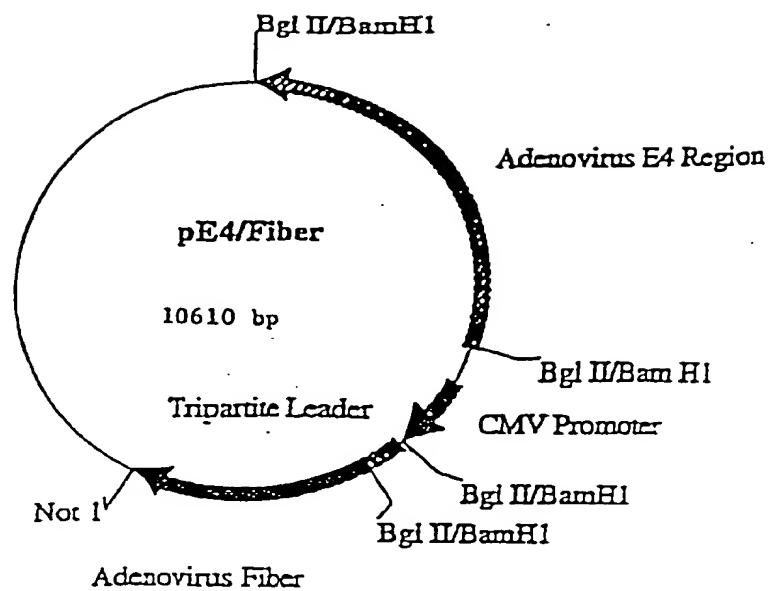
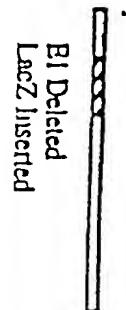


Figure 9

Functional
Packaging
Sequences



PAE1B β gal

FIGURE 4.0

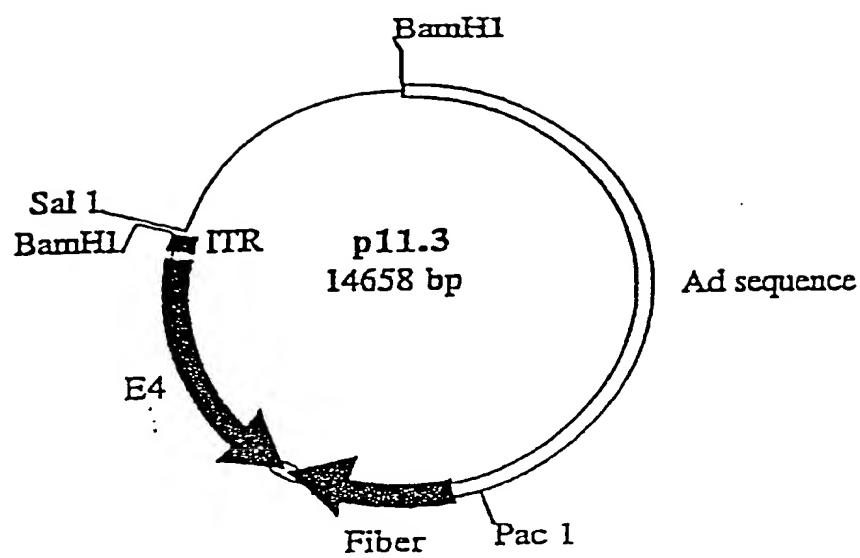
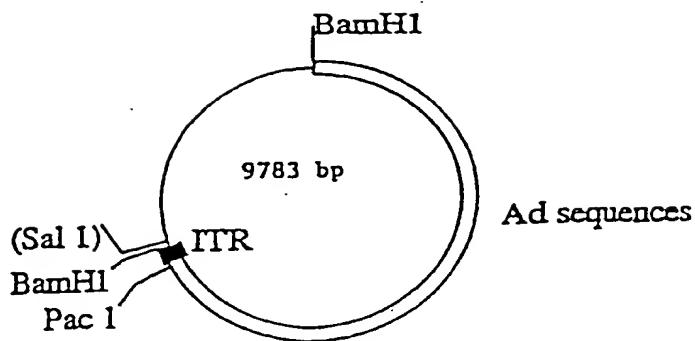


Figure 11



p8.2

FIGURE 12

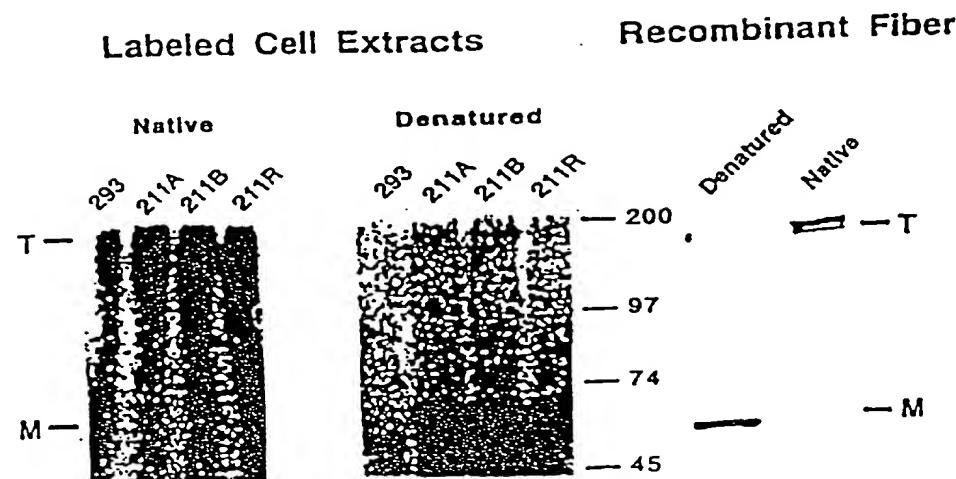
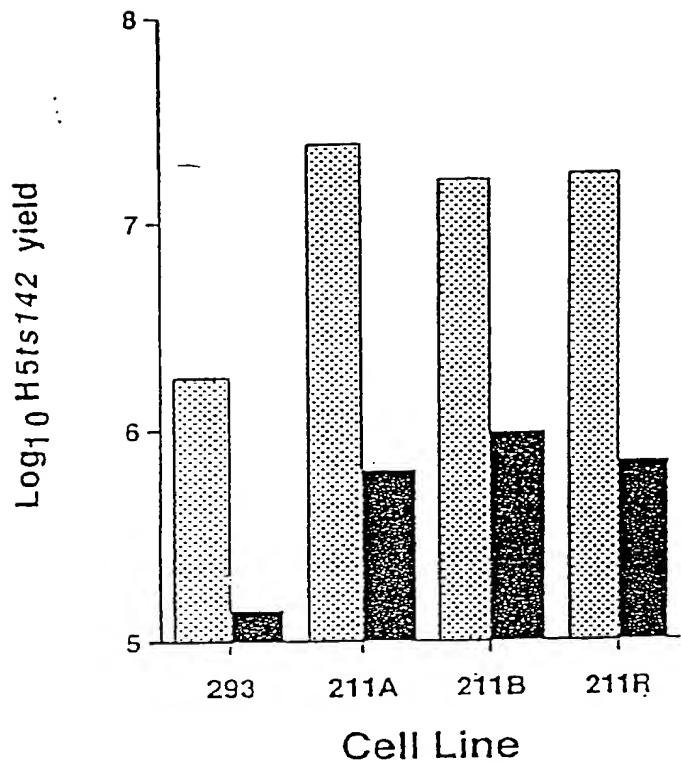


Figure 13



|
Figure 14

A

Ad2S M-KHARPS EDIFNPV VVPYDTE TGPPTV PFLTPPFV SPHIGFOESPP
Ad3 MAKHARPLS-TGCPV VVPYDTE DFEKAS - QHPFI KDOFISPDGF TQSPN
Ad18/27 MSKHARLARVEDO - FNPV VVPYDTE YARKH - KIDPFLTPPFV SEDGFKKHFPN
Ad40(1) M-KHARF - EDDFNPV VVPYDTE YH - GLDIPPFITPPFAS & HGLQEDKPP
Ad40(2) M-KHATR - IEDDFNPV VVPYDTE S STPS - IDYVADPFV S & DGLQEDMPP

B

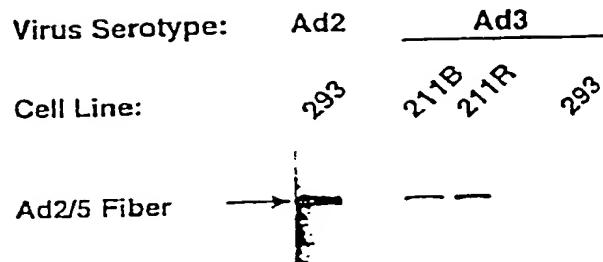


Figure 15

FIGURE 16

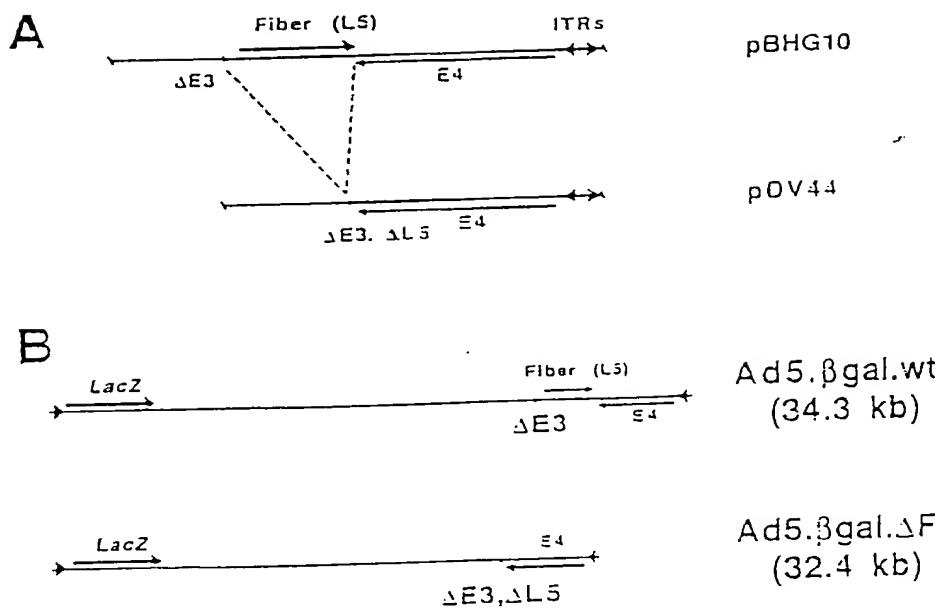
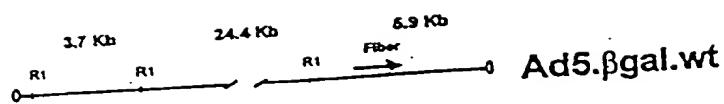
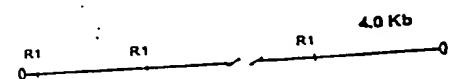


FIGURE 17

A

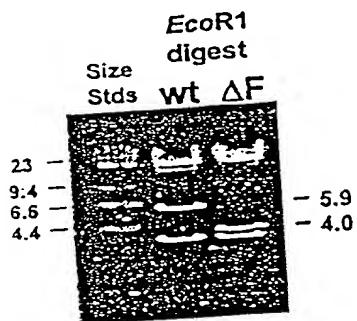


Ad5.βgal.wt



Ad5.βgal.ΔF

B



C

Fiber Probe



E4 Probe



FIGURE 18

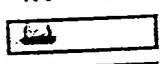
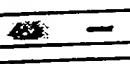
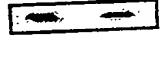
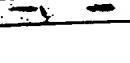
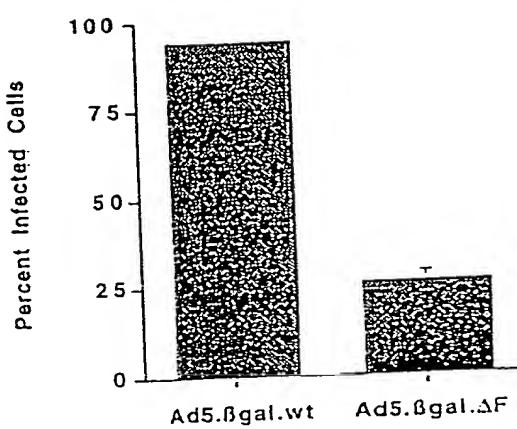
Cells	293		211B		
Virus	wt	ΔF	wt	ΔF	
				-	fiber
				-	penton

FIGURE 19

A



B

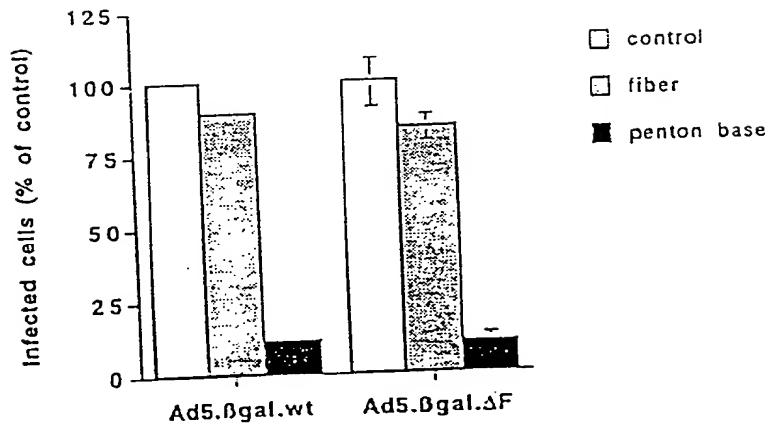
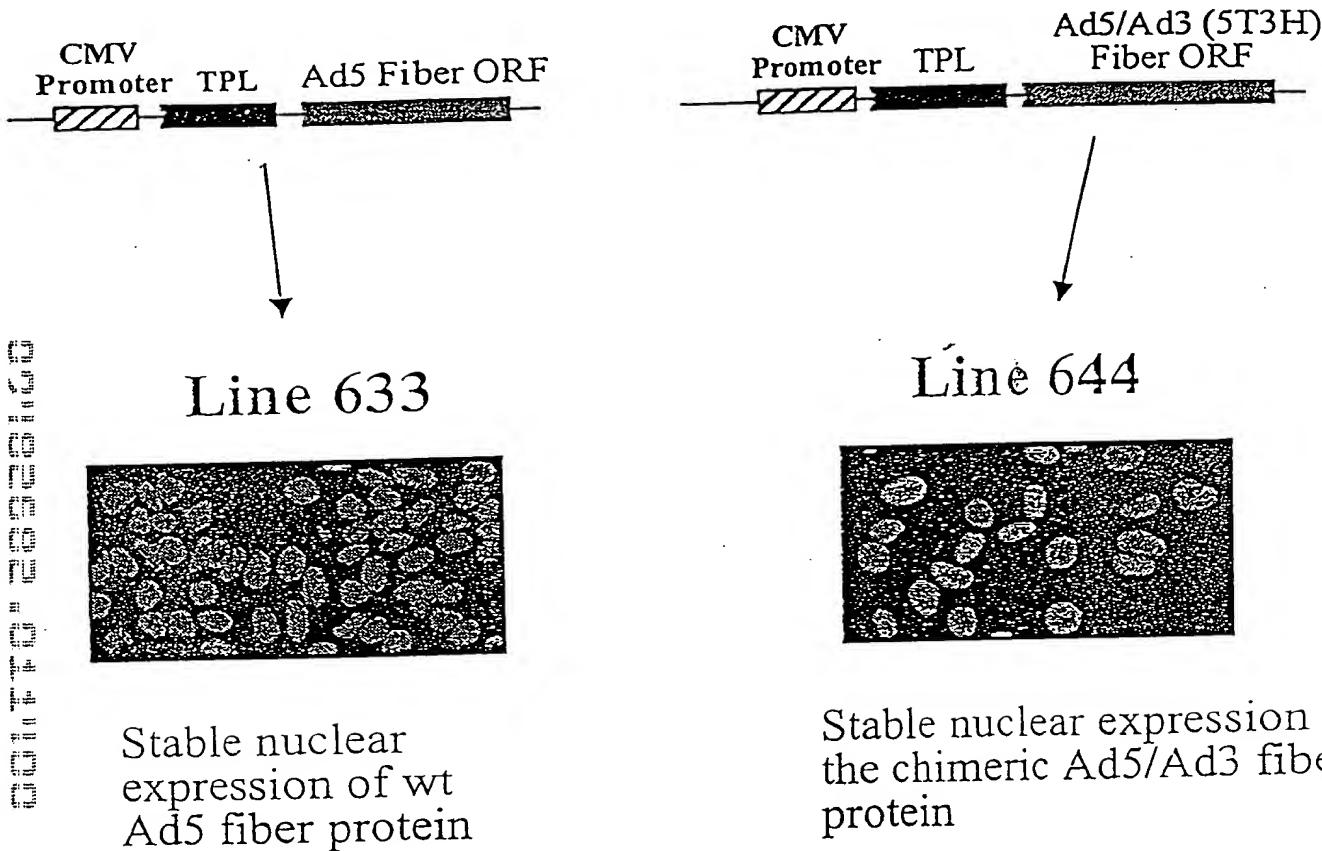


FIGURE 20

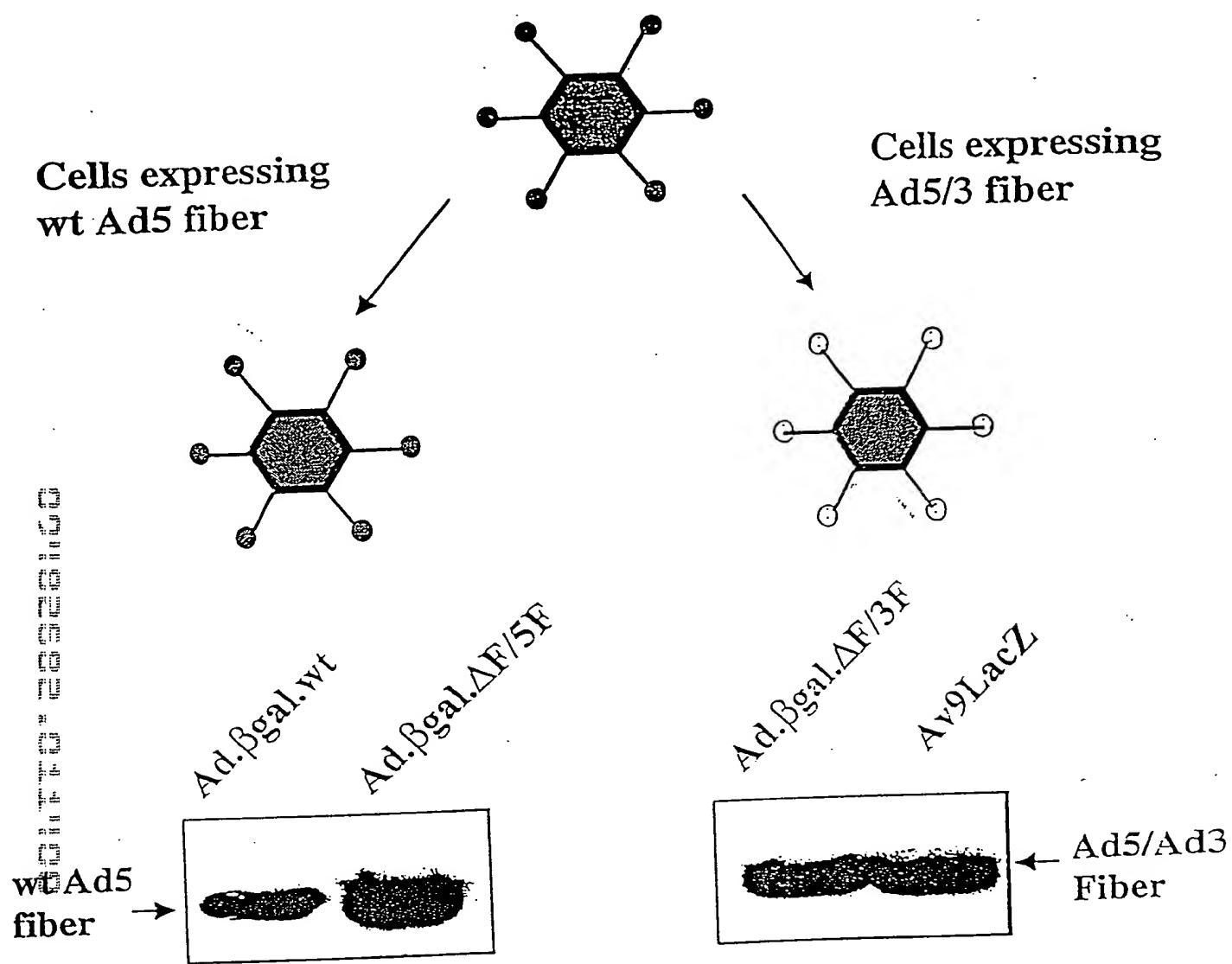
Improved Fiber-complementing Cell Lines



Indirect immunofluorescence assay of A549-based cell lines which stably express two different Ad fibers. Line 633 expresses the native Ad5 fiber protein, and line 644 expresses a chimeric fiber protein with the tail and shaft domains of the Ad5 protein and the knob domain of the Ad3 fiber. Previous work (Stevenson *et al.*, 1996) showed that a virus containing this protein had the tropism expected for Ad3.

FIGURE 21

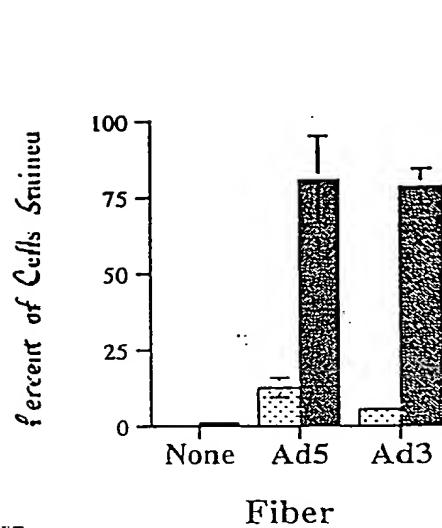
Pseudotyping of Ad. β gal. Δ F



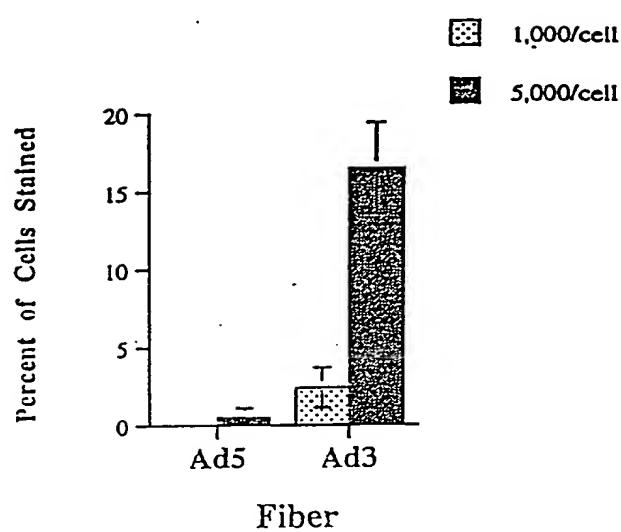
Viral particles were purified from either 632 cells (expressing wt Ad5 fiber) or from 644 cells (expressing the chimeric Ad5/Ad3 fiber). 10 μ g of the purified particles were Western blotted, and the blot was probed with a polyclonal rabbit antibody against the Ad2 fiber. Equal amounts of purified Ad. β gal.wt or A_v9LacZ (which has the chimeric fiber gene on the viral chromosome) were run as controls.

FIGURE 22

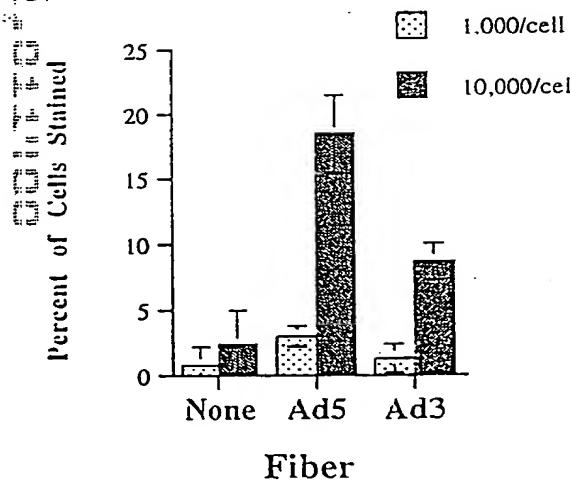
211B Cells (Human Embryonic Kidney)



MRC-5 Human Fibroblasts



A-10 Rat Aortic Endothelial Cells



THP-1 Human Monocytic Cells

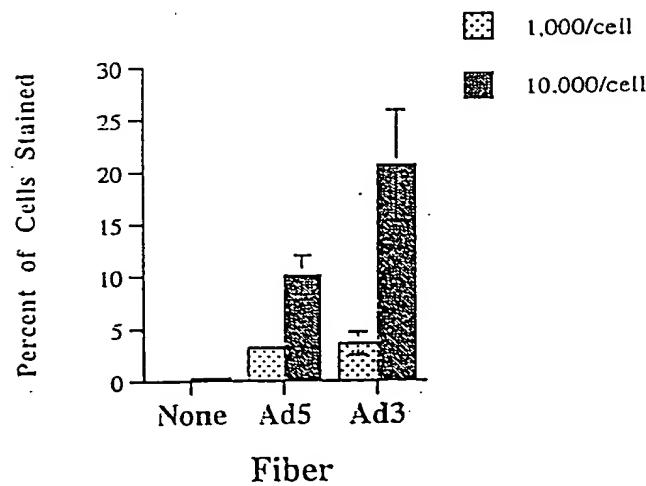
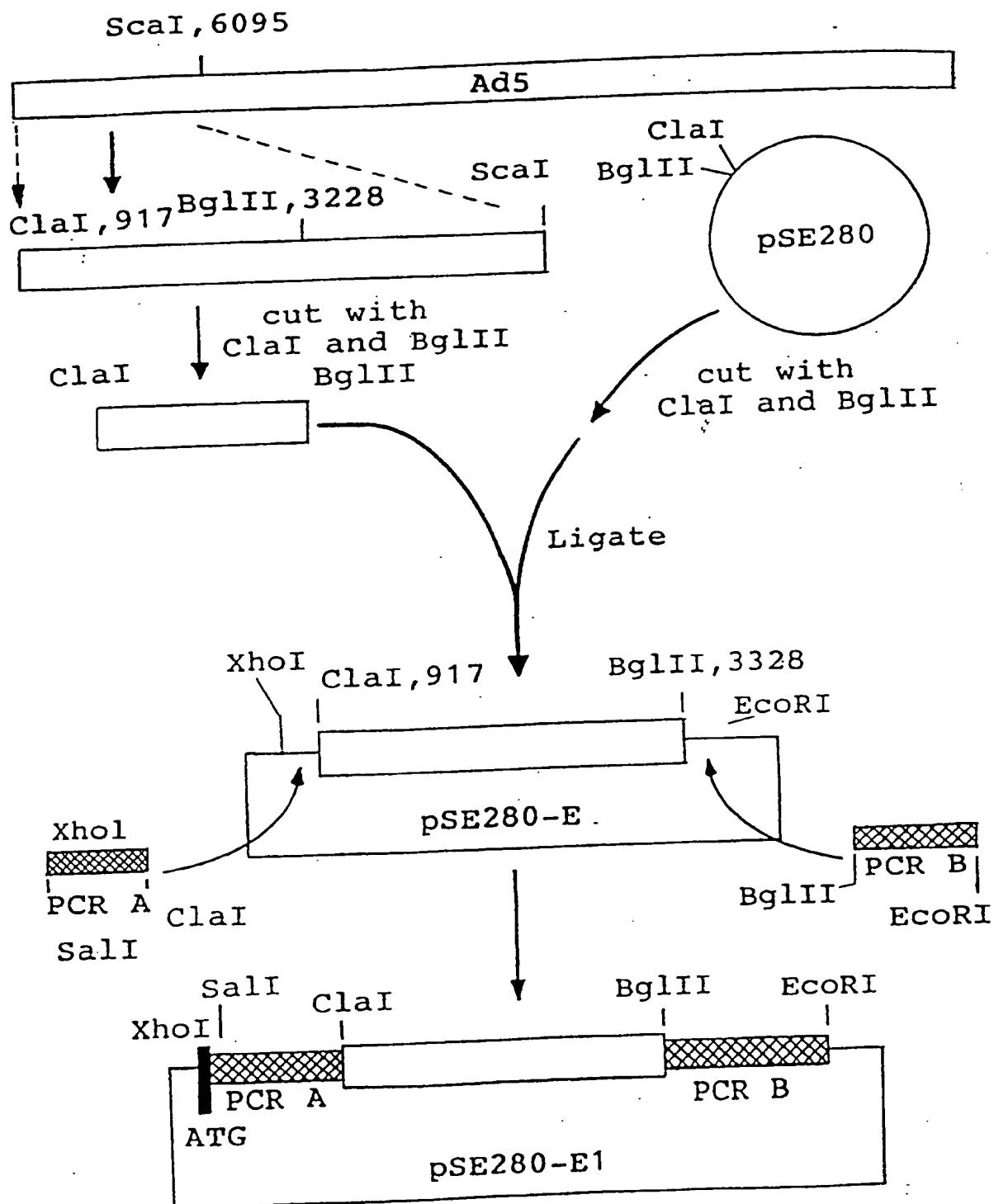
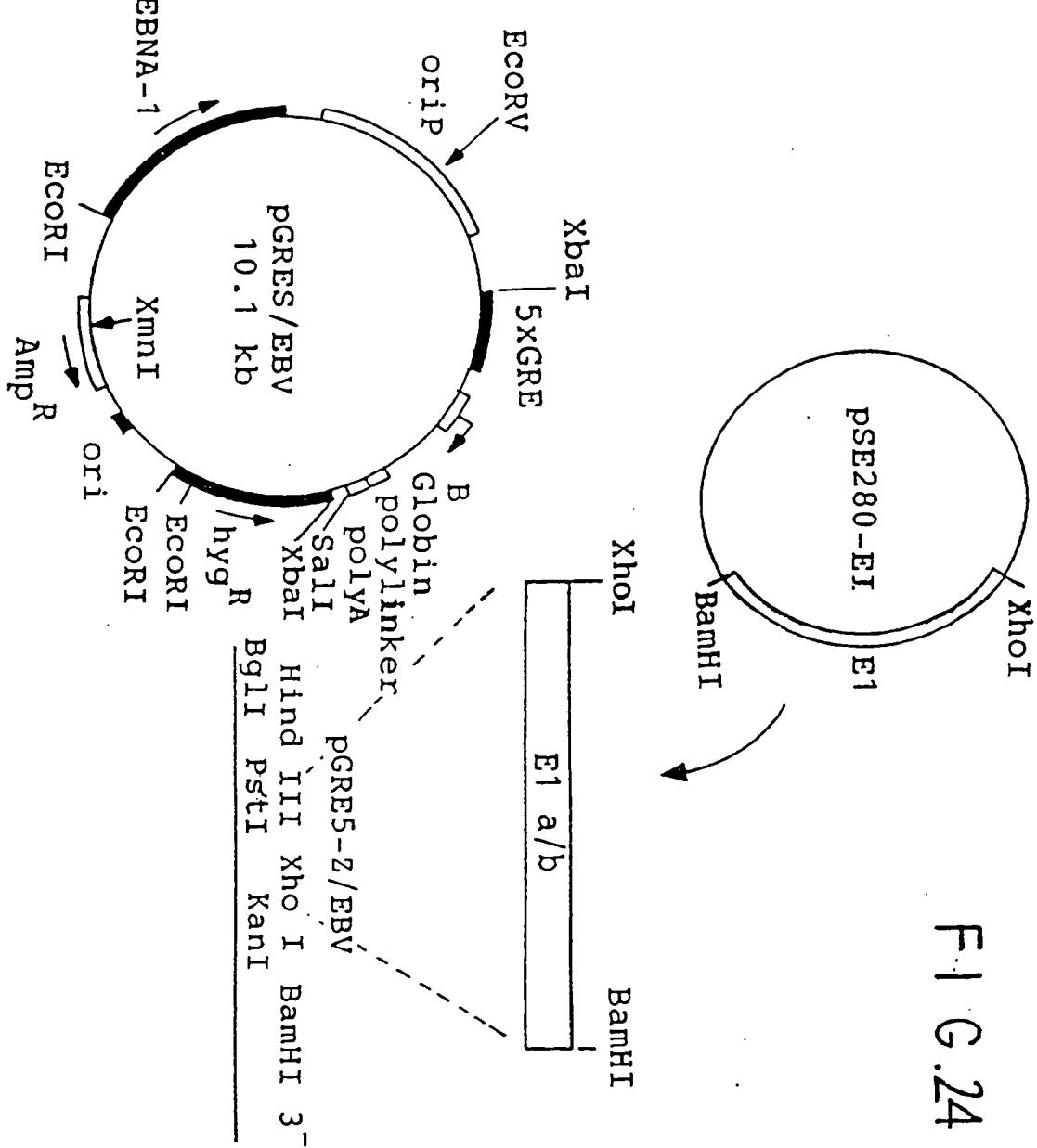


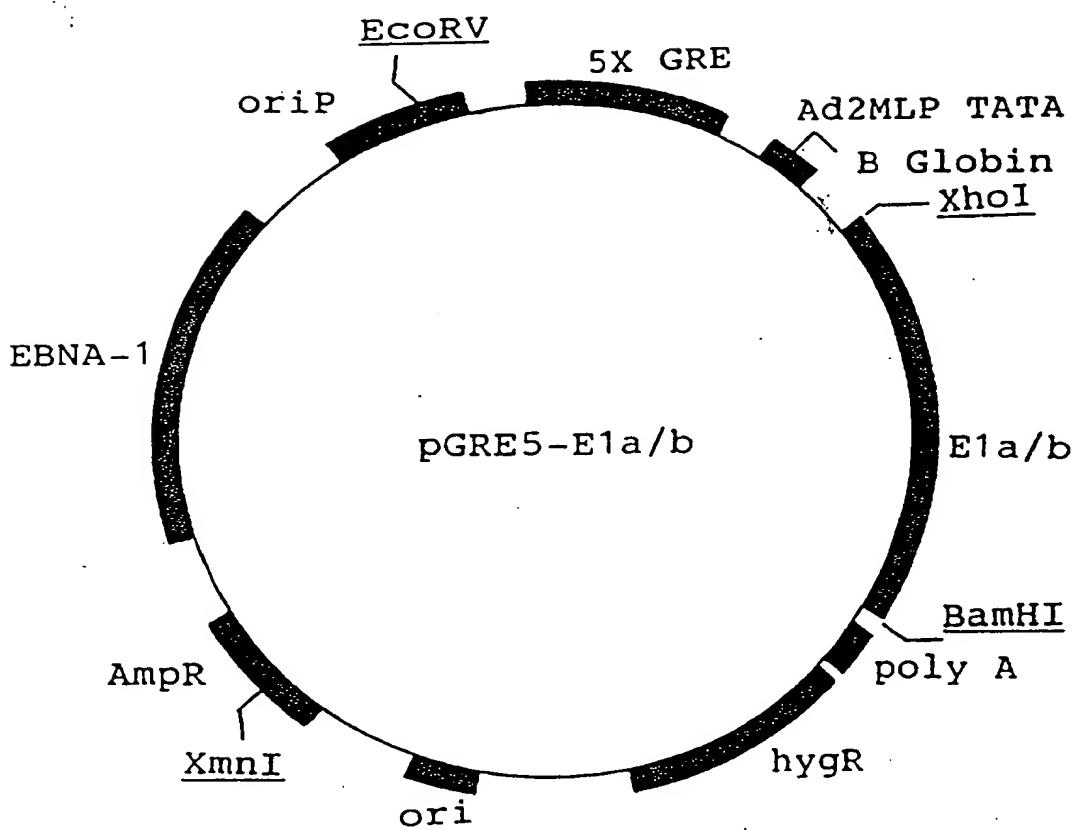
FIG. 23



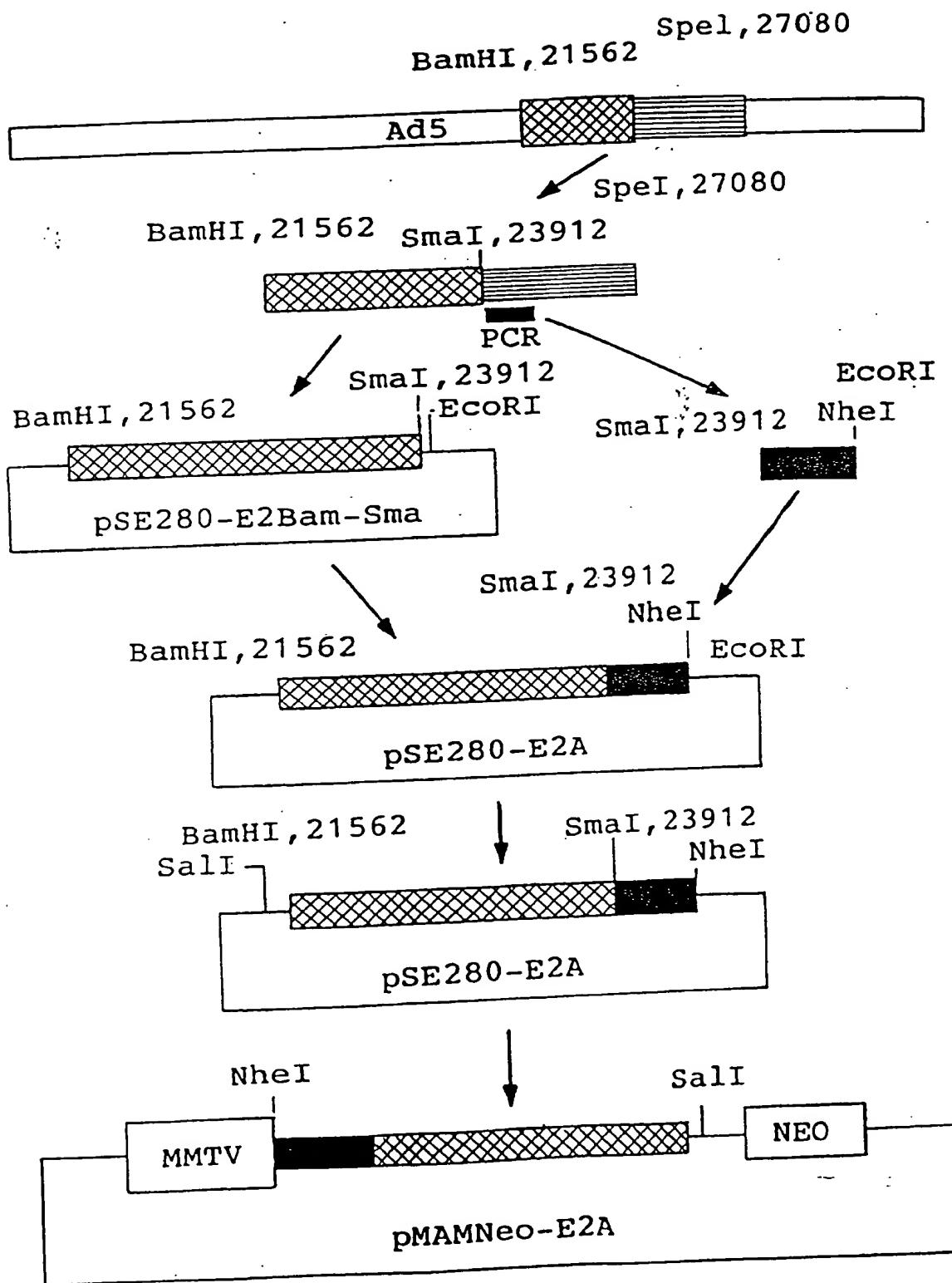
F I G .24



F | G.25



F I G .26



SUBSTITUTE SHEET (RULE 26)

Ad5. β gal. Δ F/O
Ad5. β gal. Δ F/5F
Ad5. β gal. Δ F/37F
Ad5. β gal. Δ F/37F
Ad5. β gal
Ad37. β gal
Ad37 Fiber Knob

anti-37F



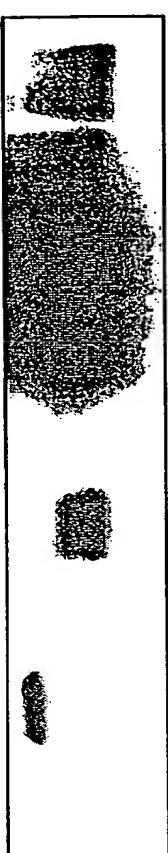
— Ad37 Fiber
— Ad37 Fiber Knob

anti-5F



— Ad5 Fiber

anti-PB



— Ad5 Penton Base
— Ad37 Penton Base

FIGURE 27

**PCR analysis for fiber presence contamination of
fiberless adenonovectors.**

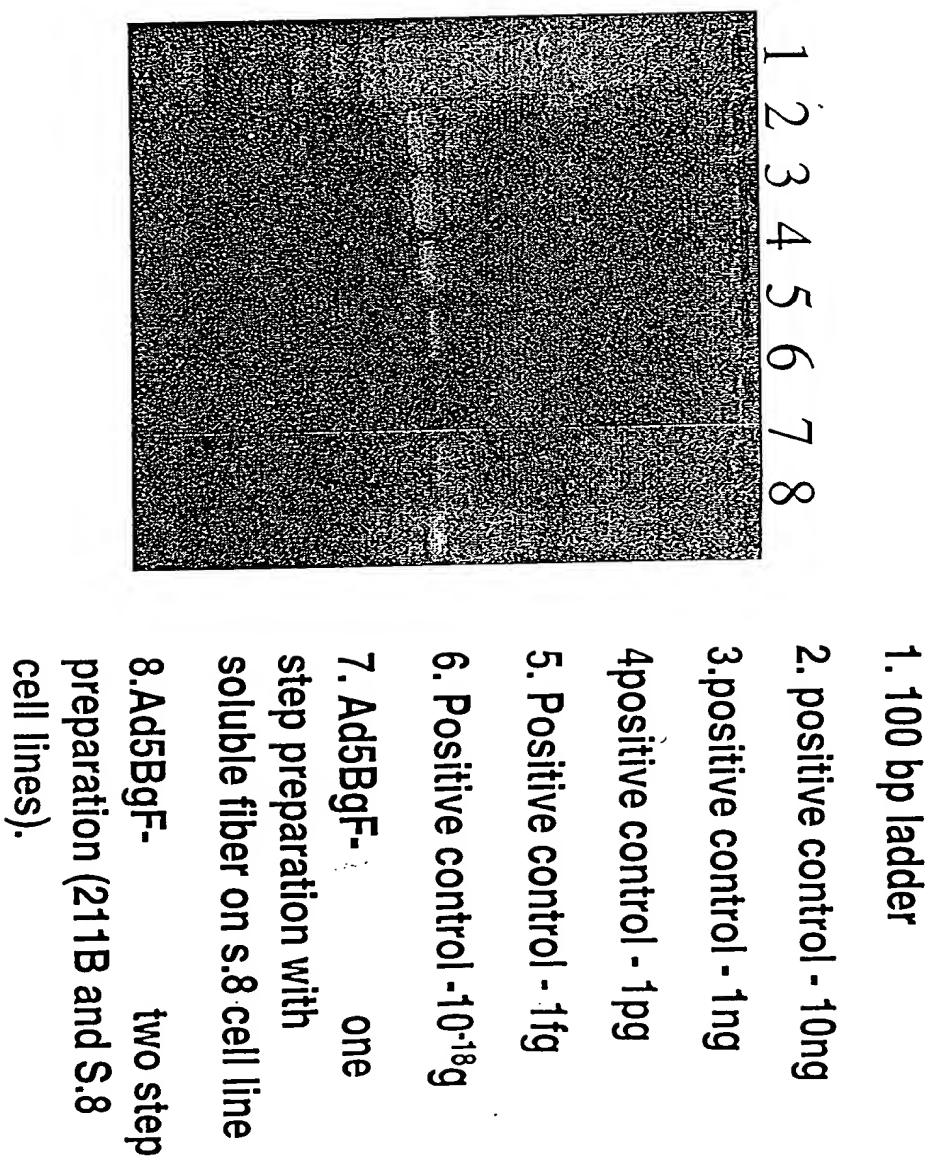


FIGURE 28

**Transduction Efficiency For Fiberless Virus with and without soluble fiber
(10ng/well) on S.8 cell line.
Chemoluminescent reporter gene assay.**

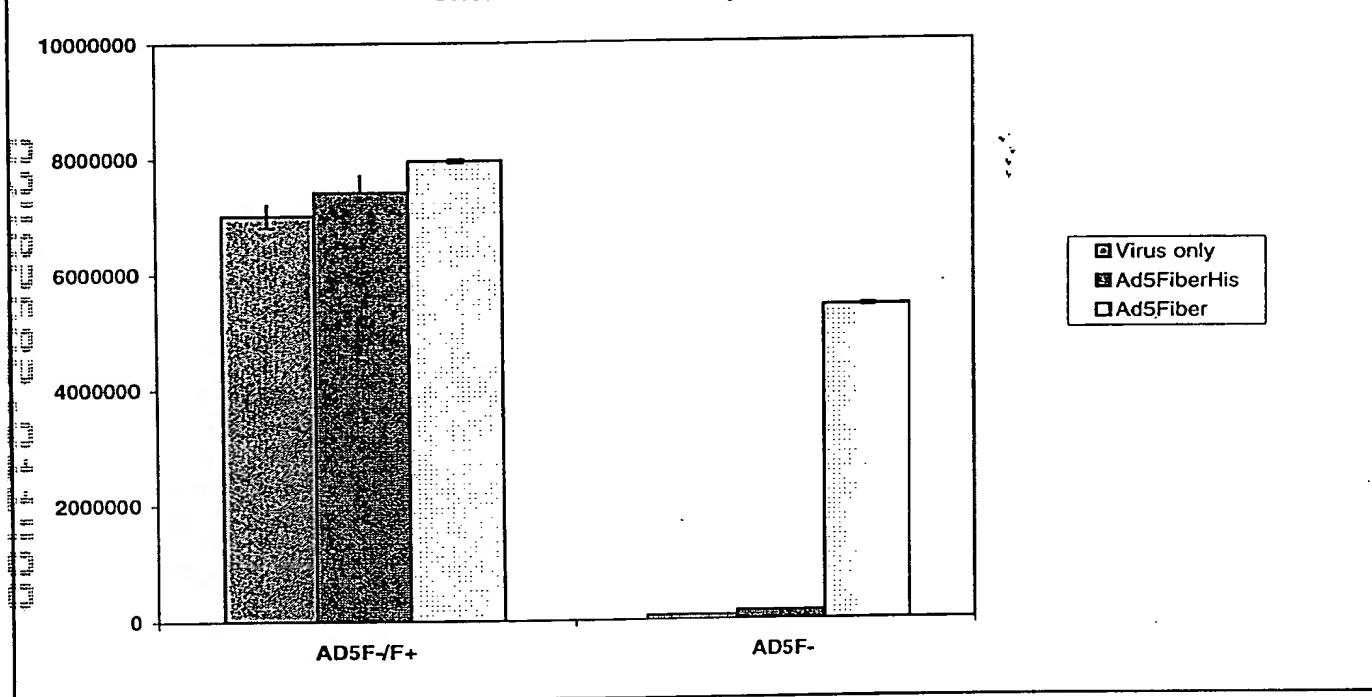


FIGURE 29

**Transduction Efficiency of Ad5BgF- on HDF cell line with presence
of different amount of 633 condition media.**

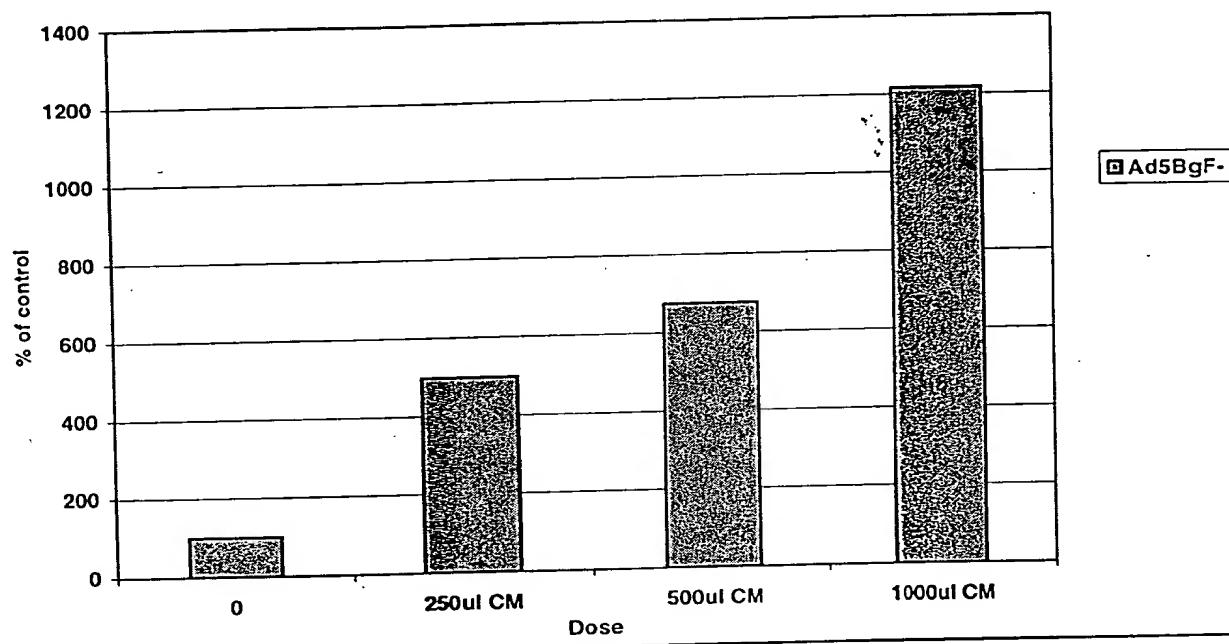


FIGURE 30